



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/748,385	12/29/2003	Wen Wei	110751-135445	8161

31817 7590 06/19/2006

SCHWABE, WILLIAMSON & WYATT
PACWEST CENTER, SUITE 1900
1211 S.W. FIFTH AVE.
PORTLAND, OR 97204

EXAMINER

BUI, HUNG S

ART UNIT PAPER NUMBER

2841

DATE MAILED: 06/19/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/748,385

Applicant(s)

WEI, WEN

Examiner

Hung S. Bui

Art Unit

2841

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 19 May 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-22 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 29 December 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-6, 11-16 are rejected under 35 U.S.C. 102(b) as being anticipated by Patriche et al. [US 6,499,609] in view of Bishop et al. [US 2002/0149911].

Regarding claims 1 and 11, Patriche et al. disclose a modular platform (figures 1-3), comprising:

- a chassis (10) having a front side and a back side, and configured to receive module platform boards (16, figures 1-3); and
- a plenum associated with the chassis (24, column 3, lines 1-3), wherein the plenum is in a substantially parallel relationship with a flow of a cooling medium passing through the plenum.

Patriche et al. disclose the instant claimed invention except for at least one chassis management module being removably mounted therein the rack/chassis system.

Bishop et al. disclose a chassis system (figures 1-3) having at least one chassis management module (26, 28) being removalby mounted therein the chassis system to control operation of another platform boards in therein (paragraphs 0078 and 0080-0081).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use add the chassis management module design of Bishop et al. in the chassis system of Patriche et al., for the purpose of controlling operation of another platform boards in the chassis system.

Regarding claims 2 and 12, Patriche et al. disclose the plenum (24) being a dual plenum and the chassis management module (14) being positioned substantially vertical in the dual plenum (figure 1).

Regarding claims 3 and 13, Patriche et al. disclose the dual plenum including two or more fan modules (26, figures 2-4) that are independently removable from the plenum.

Regarding claims 4 and 14, Patriche et al. further disclose the chassis management module (14) being vertically positioned about an outer edge of at least one of the fan modules (26, figures 1-2), and independently removable from the at least one fan module.

Regarding claims 5 and 15, Patriche et al. disclose the chassis management module (17) being vertically positioned between at least two fan modules (26, figure 2), and independently removable from the at least two fan modules.

Regarding claims 6 and 16, Patriche et al. disclose the chassis management module being removable from the front side of the modular platform (figure 1).

Art Unit: 2841

3. Claims 7-10 and 17-22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Patriche et al., as modified, as applied to claims 1 and 11 above, and further in view of Harris et al. [US 2003/0235042].

Regarding claims 7-8 and 17-18, Patriche et al., as modified, disclose the instant claimed invention except for the chassis management module performs the functions of the shelf management controller to control the interaction between components of the modular platform.

Harris et al. disclose a rack system having at least one PIC (figure 3, paragraphs 30-31), which has a function of the management controller to control the interaction other modules in the rack system.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to use the card interface of Harris et al., with the card of Patriche et al., as modified, for the purpose of providing management other modules in the system.

Regarding claims 9 and 19, Patriche et al., as modified, disclose the instant claimed invention except for the specific numbers of modular platform boards being supported by at least one fan module and a power entry module.

The specific number of modular platform board being supported by at least one fan module and a power entry module would have been an obvious design consideration based on the numbers of modular boards needed to be cooled, and users can be chosen the specific of fan module and a power module can be supported for cooling the intended modular boards.

Art Unit: 2841

Regarding claims 10 and 20, Patriche et al., as modified, disclose the instant claimed invention except for the specific height of a dual plenum and the chassis management module.

The specific height of the dual plenum and the chassis management module would have been an obvious consideration based on an arrangement of the height of the dual plenum intended to be used and the height of the chassis management module intends to be fixed with the dual plenum in the rack system.

Regarding claim 21, Patriche et al., as modified, disclose the instant claimed invention except for the rack having an aggregate height limitation of 42U.

The specific height of the rack would have been an obvious consideration based on the specific height of each modular boards intended to be used by users.

Regarding claim 22, Patriche et al. disclose the rack including four modular platforms, at least one of the four modular platform being coupled to at least one dual plenum and having a chassis management module substantially vertically and removably positioned in each dual plenum (figure 2).

Response to Arguments

4. Applicant's arguments with respect to claims 1-22 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

- Basara et al. [US 5,216,579] disclose a rack based packaging system for cooling and power management module; and
- Beithelmal et al. [US 6,904,968] disclose an apparatus for cooling components of electronic system.

6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

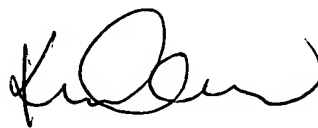
Art Unit: 2841

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hung S. Bui whose telephone number is (571) 272-2102. The examiner can normally be reached on Monday-Friday 8:30AM-6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kamand Cuneo can be reached on (571) 272-1957. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

6/2/06
Hung Bui
Art Unit 2841



K Cuneo
OE 2841